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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
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EXAMINER

JAMAL, ALEXANDER

ART UNIT

PAPER NUMBER

2614

MAIL DATE

DELIVERY MODE

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PAPER

**Please find below and/or attached an Office communication concerning this application or proceeding.**

The time period for reply, if any, is set in the attached communication.

<b>Office Action Summary</b>	<b>Application No.</b> 09/752,167	<b>Applicant(s)</b> MILLER, MERLE L.	
	<b>Examiner</b> ALEXANDER JAMAL	<b>Art Unit</b> 2614	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

### Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

### Status

- 1) ☒ Responsive to communication(s) filed on 12 October 2009.
- 2a) ☐ This action is **FINAL**.                      2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

### Disposition of Claims

- 4) ☐ Claim(s) \_\_\_\_\_ is/are pending in the application.  
4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 9-12, 19-22 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

### Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

### Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).  
a) ☐ All    b) ☐ Some \*    c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
  2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

### Attachment(s)

- |  |   |
|--|---|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892)   | 4) <input type="checkbox"/> Interview Summary (PTO-413)<br>Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftperson's Patent Drawing Review (PTO-948)                        | 5) <input type="checkbox"/> Notice of Informal Patent Application                       |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08)<br>Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____  |

## DETAILED ACTION

### *Response to Amendment*

#### *Claim Rejections - 35 USC § 112*

1. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

2. **Claims 9-12,19-22** are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

The claims recite a feedback path but the specification cites that a feedback path may contain any number of processing stages, it is not clear how the feedback path is defined. The examiner notes applicant's figure 2 shows a 'feedback path' but with additional nodes coupling to blocks 360 and 320. Are these included in the loop ? this is not clear.

The claims all recite a 'lesser current' flows through at least one component, it is not clear how less current would only flow through one component on the loop when the loop was bypassed as all the components would be in series and all would receive less current. Further, it is not clear exactly what the current is lesser than.

Correction/Clarification is requested.

### **Claim Rejections - 35 USC § 102**

3. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless -

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

4. **Claims 9-12, 19-22** are rejected under 35 U.S.C. 102(b) as being anticipated by Moyal et al [US 5,809,109].

Regarding **claim 9**, Moyal et al disclose an apparatus, as shown in Fig. 4, comprising: a feedback path having an input and output terminal (18, 20), the feedback path including an analog-to-digital converter (110) for processing voice signals (Vin) [Fig. 4; col. 3, lines 19-38] ; a switch (105) for coupling the input and output terminal of the feedback path in response to receiving a control signal (i.e. ring command) [Fig. 4; col. 3, lines 11-18]; and a ringing generator (202) for providing a ringing signal to a subscriber line in response to the control signal [Fig. 4; col. 3, line 47-63; col. 4, line 39 to col. 5, line 2]. Less current will flow through the A/D with Vin, than with the ringing signal because Vin is digital level and a ringing signal is inherently greater as it must drive a telephone line. And as such would cause more current to flow through the A/D.

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Regarding **claim 22**, Moyal et al disclose an apparatus, as shown in Fig. 4, comprising:

means (SLAC 4) for processing a signal received over a subscriber line by one or more components in a first path [SLIC 2], the first path having an input terminal (18) and an output terminal (20) [Fig. 4];

means (DSP 120) for receiving a control signal (Ring command);

means (switch 105) for coupling the input and the output terminal of the first path in response to receiving the control signal [Fig. 4; col. 4, line 51 to col. 5, line 2]; and

means (ring generator 202) for providing a ringing signal to the subscriber line responsive to the control signal [Fig. 4; col. 2, line 41 to col. 5, line 20].

**Claim 19** is essentially similar to claim 22 and is rejected for the reasons stated above a propos of claim 22.

**Regarding claim 18**, Moyal et al disclose an apparatus, as

shown in Fig. 4, comprising:

means (DSP 120) for using an analog-to-digital converter for processing voice signals [Fig. 4; col. 3, lines 19-39];

means (DSP 120) for using the analog-to-digital converter for DC feed control signal [Fig. 4; col. Col. 3, lines 40-45; col. 4, line 8-20; col. 5, lines 31-50];

means (DSP 120) for receiving a ringing control (Ring command) [Fig. 4];

means (ringing generator 202) for transmitting a ringing signal to a subscriber line in response to the ringing control signal [Fig. 4; col. 2, line 41 to col. 5, line 20; col. 3, lines 11-18];

means (A/D converter 110) for receiving a portion of the ringing signal from the subscriber line

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[col. 2, lines 47-64];

means (A/D converter 110) for converting the portion of the ringing signal to a digital signal using the analog-to-digital converter(110) [Fig. 4];

and

means (DSP 120) for providing a ring-trip indication in response to the digital signal [Fig. 4; col. 2, lines 57-64; col. 3, lines 40-45; col. 6, lines 24-32].

**Regarding claims 10-12, 20-21**, the limitations are shown above in cancelled claim 18 rejection (the examiner left the claim 18 rejection in order to show applicant that the relevant portions of the prior art had been cited in a previous office action.

### ***Response to Arguments***

1. Applicant's arguments have been fully considered but they are not persuasive.

As per applicant's explanation of the 'lesser current' claim element, the examiner again notes that applicant's specification and argument both recite that there may be any either number of circuits coupled to the loop. The specification does not clearly define the feedback loop, as such the examiner again recommends citing the actual signal path, including all the components in the feedback path. Applicant's fig. 2 additionally shows additional nodes coupling the feedback path, as such the A/D may experience current draw from either of those two nodes.

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Again the examiner maintains it is not clear what lesser current flow is because the feedback path to which the lesser current is referring to is not clear.

As per applicant's arguments concerning the prior art having a different 'loop' than that claimed by applicant, the examiner maintains that the feedback path as claimed is not clear. As per applicant's arguments about the switching to  $V_{in}$  not being a node of the feedback path, the examiner notes that every single element that requires power ( $V_{in}$ ), including the A/D converter will derive that power from a battery or bias signal which will flow from a source to the ground. The ground additionally will be part of the feedback path for the power supply that regulated the battery voltage. This is an additional feedback loop which intersects with and can be part of the other 'feedback loop' that was recited in the claim rejections above. The prior art, much like applicant's specification, both disclose devices with multiple feedback paths.

The examiner again notes that the prior art specifically discloses switching out a component in order to reduce current through that component using a call control signal. This is what applicant's device is doing. The examiner again requests applicant to claim the 'feedback loop' clearly and in its entirety with all components so that the claimed switching and lesser current function are clearly defined.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Alexander Jamal whose telephone number is 571-272-7498, and whose email address is alexander.jamal@uspto.gov

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The examiner can usually be reached on M-F 8AM-5PM.

If attempts to reach the examiner by telephone or email are unsuccessful, the examiner's supervisor, Curtis A Kuntz can be reached on 571-272-7499.

The fax phone numbers for the organization where this application or proceeding is assigned are **571-273-8300** for regular communications and **571-273-8300** for After Final communications.

/Alexander Jamal/

Primary Examiner, Art Unit 2614

Examiner Alexander Jamal

December 16, 2009